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EXAMINER

GISHNOCK, NIKOLAI A

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PAPER

Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

Office Action Summary	Application No. 10/748,441	Applicant(s) COOKSON ET AL.	
	Examiner Nikolai A. Gishnock	Art Unit 3714	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 21 February 2008.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-41 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 1-41 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on 29 December 2003 is/are: a) ☒ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
 2. ☐ Certified copies of the priority documents have been received in Application No. _____.
 3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- | | |
|--|---|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892) | 4) <input type="checkbox"/> Interview Summary (PTO-413) |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948) | Paper No(s)/Mail Date. _____ |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO/SB/08) | 5) <input type="checkbox"/> Notice of Informal Patent Application |
| Paper No(s)/Mail Date _____ | 6) <input type="checkbox"/> Other: _____ |

DETAILED ACTION

In response to Applicant's remarks filed 2/21/2008, claims 1-41 are pending.

Claim Rejections - 35 USC § 112

1. The following is a quotation of the second paragraph of 35 U.S.C. 112:

The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.

2. Claims 15 -28 are rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention. Claim 15 recites language falling within the scope of 35 U.S.C. 112, sixth paragraph. See MPEP 2181. In the instant claim, the limitation, "means for sending information to a user computer", seems to be modified by sufficient structure for achieving the specified function, as the claim further recites, "Wherein the host computer system is programmed to... send the data representation to the user computer". It is unclear if the Applicant wants the limitation treated under 35 U.S.C. 112, sixth paragraph. If an applicant wishes to have the claim limitation treated under 35 U.S.C. 112, sixth paragraph, applicant must show that the claim limitation is written as a function to be performed and does not recite sufficient structure, material, or acts which would preclude application of 35 U.S.C. 112, sixth paragraph. see *Seal-Flex*, 172 F.3d at 849, 50 USPQ2d at 1234; *Envirco Corp. v. Clestra Cleanroom, Inc.*, 209 F.3d 1360, 54 USPQ2d 1449 (Fed. Cir. 2000); *Rodime PLC v. Seagate Technology, Inc.*, 174 F.3d 1294, 1303-04, 50 USPQ2d 1429, 1435-36 (Fed. Cir. 1999); and *Cole v. Kimberly-Clark Corp.*, 102 F.3d 524, 531, 41 USPQ2d 1001, 1006 (Fed. Cir. 1996). If the phrase "means for" or "step for" is modified by sufficient structure, material or acts for achieving the specified function, the USPTO will not apply 35 U.S.C. 112, sixth paragraph, until such modifying language is deleted

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from the claim limitation. In the event that it is unclear whether the claim limitation falls within the scope of 35 U.S.C. 112, sixth paragraph, a rejection under 35 U.S.C. 112, second paragraph may be appropriate. Claims 16-28 inherit this deficiency.

Claim Rejections - 35 USC § 102

3. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

4. Claims 1, 7-15, 18, 19, 21-34, and 38-41 are rejected under 35 U.S.C. 102(b) as being anticipated by Huff (US 2002/0032687 A1), hereinafter known as Huff.

5. Huff discloses a computerized system and method for creating a family tree, comprising: receiving genealogy data from at least one primary source at a host computing system (Para. 0027 & 0014), creating one or more node records and link records using the data (Para. 0028), where individual node records include at least name data (Para. 0036) and link records include data that represents a relationship between individual node records (Para. 0098); comparing individual node records and identifying pairs of records having similar data; comparing each identified pair of node records having similar data, and deciding based on predetermined criteria whether the identified records represent the same person; consolidating the information from a plurality of records into a single person record (online accumulation and comparison of data from multiple sources with the goal of accurate linking to overcome duplication, Para. 0123; Predetermined criteria in Para. 0164) by at least in part adding information from a plurality of records determined to represent the same person to the single person record (In prior

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genealogical databases, each name on the search list allows entry into a different pedigree structure that can be navigated and examined. It would be better to consolidate the data and minimize the number of names one needs to examine, Para. 0155; When submissions overlap, duplicate names should have the benefit of connections to data in both submissions. So, when someone "deletes" a duplicate name, that person would also have the responsibility to see that all the right connections from the remaining name were made into the other submission that he was partially deleting; the process being discussed is the third-party ADD LINK process that connects related submissions together, Para. 0158-9); receiving a request from a user computer to display a family tree (Para. 0210); using the link, node, and single person records to create a data representation of the requested family tree; and sending the data representation to the user computer for display (Para. 0209) [Claims 1 & 15].

6. Huff discloses where the genealogy data is selected from a group consisting of a birth certificate database and a death certificate database (birth, marriage, death, burial, and so forth, Para. 0100), a census database (Para. 0091), and a family history records database (Home PC data, Internet data, Ancestral File, and International Genealogical Index, Para. 0089) [Claims 7 & 21]. Huff discloses receiving genealogy data as a GEDCOM file (Para. 0024) [Claims 8 & 22].

7. Huff discloses where the records are used to create a file comprising the requested family tree including alternatives for relationships for display to a user, comprising: receiving a selection representing a user choice among the alternatives (when family connections are discovered in the database, a separate set of links can be created to complete those ties between all descendant collections, Para. 0116); using the selection to update the family tree (Para. 0088); and storing the selection (Para. 0091) [Claims 9 & 23].

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8. Huff discloses receiving new information that changes the family tree; and providing the user an opportunity to revise the selection (adding extra data for names already in the database and/or making corrections to data, Para. 0218) [Claims 10 & 24].

9. Huff discloses receiving information from a user, comprising a selection for the group consisting of a digital picture, a text file, genealogy data, a user-entered text file, a sound file, a video file, and a computer-readable file (Para. 0036); and storing the information where it is available to other users (storing names and data of people; displaying genealogical data to a plurality of users, Para 0036) [Claims 11 & 25].

10. Huff discloses receiving additional genealogy data subsequent to sending the file to the user computer (allows any interested party to add links between database names without making changes to the submission data, Para. 0100; changes are inherently made subsequent to the submission data having been sent to the user's computer); and notifying the user of the changes (automating the notification for genealogy research, Para. 0100) [Claims 12 & 26].

11. Huff discloses where notifying the user comprises a selection from the group consisting of: displaying a notification to the user upon the user accessing the host system (Online "Auction" or Bulletin Board" Facility, Para. 0214-0215; also, Fig. 4 for the display) [Claims 13 & 27].

12. Huff discloses receiving a request from the user computer to send more detailed information relating to the family tree, subsequent to sending the file; using the records to compile the more detailed information; and sending the more detailed information to the user computer (all at Para. 0094; also Para. 0117-0118) [Claims 14 & 28].

13. Huff discloses where the individual node records span a single generation (main table Person_T contains the name and basic identifying items assigned to that {one} person, Para. 0135) [Claim 18], or multiple generations (Links_T table contains links to the all the name

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records in the family, Para. 0137; Links_T can be used separately from the Person_T name data record, Para. 0138) [Claim 19].

14. Huff discloses a computerized system and method for creating a family tree, comprising: receiving data at a host computer system (central server, Para. 0027) that defines a plurality of personas (having a capacity for storing names and data on up to 10 billion people, Para. 0036), where the data comprises one or more assertions {events or attributes, or other presumed truths about a persona} for each persona, where each persona represents a person (events such as birth, marriage, death, or burial; attributes such as health, medical, and genetic data; all in Para. 0100); storing each persona as a persona record (Para. 0028); receiving a request from a user at the host computer to provide a family tree (Para. 0210), where the request comprises at least one assertion (Indexing and cross-reference; Para. 0170-0183); identifying an initial persona record and performing an analysis to infer any relationships with other persona records using the assertions of the initial persona record and the other records (comparing indexed records having the same source notation, such as census record or land record entries, Para. 0172); if inferred, assigning at least one relationship type to the relationship between the records (links to tie together family connections, Para. 0116); using the persona records and the relationship types to construct a family tree (pedigree charts, Para. 0206); and sending the file comprising at least a portion of the family tree to the user for display (server would take the selected data and create the image in the appropriate player, Para. 0209) [Claims 29 & 39].

15. Huff discloses repeating the attempt to infer and assign types for the other persona records until no additional relationships are inferred (the process {of minimizing duplication} is cumulative, Para. 0163) [Claim 30].

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16. Huff discloses where the initial persona record is identified using the last name provided by the user (index to surname, Para. 0039; user would indicate the {initial} name to begin with, Para. 0210) [Claim 31].

17. Huff discloses where the relationship analysis is performed prior to receiving the request from the user (the computer and professional participants would do most of the work {consolidating the data} before the users even looked at the data, Para. 0155) [Claim 32].

18. Huff discloses where the assertions for a particular persona record originate from a single source (such as the IGI, a large database containing some 300 million names and linking data, Para. 0089) [Claim 33].

19. Huff discloses where the single source comprises a selection from the group consisting of a census record, a user input (manual conversion from raw source records input data, Para. 0090), and a government record (Internet data, Para. 0089; which includes U.S. decennial censuses, Para. 0091; and see www.census.gov) [Claim 34].

20. Huff discloses where the relationship types comprise a selection from the group consisting of a same person, or a spouse (Para. 0098, 0137, and 0213) [Claim 36].

21. Huff discloses where assertions comprise a selection from the group consisting of name, birthday, and death day (Para. 0135), and birth city (birth place, Para. 0044) [claim 38].

22. Huff discloses where the request from the user comprises at least a name Para. 0210) [Claim 40].

23. Huff discloses where the host computer is operable to perform the relationship analysis in response to a request from the user (Ancestral File previously used automatic comparison process, Para. 0165-0166) [Claim 41].

Claim Rejections - 35 USC § 103

24. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

25. The factual inquiries set forth in *Graham v. John Deere Co.*, 383 U.S. 1, 148 USPQ 459 (1966), that are applied for establishing a background for determining obviousness under 35 U.S.C. 103(a) are summarized as follows:

1. Determining the scope and contents of the prior art.
2. Ascertaining the differences between the prior art and the claims at issue.
3. Resolving the level of ordinary skill in the pertinent art.
4. Considering objective evidence present in the application indicating obviousness or nonobviousness.

26. Claims 2 & 16 are rejected under 35 U.S.C. 103(a) as being unpatentable over Huff, in view of Griswold et al. (US 4,501,559).

27. Huff teaches using the genealogy data to create surname records (Person_T database table, Para. 0135), including a surname (Para. 0039), and data representing the number of times the corresponding surname is encountered in the genealogy data (the computer counts the connections of the old name to be deleted, and then counts the connections of the name to replace it, Para. 0164), and using the surname records to partition the individual node records into groups prior to comparing the individual node records (the new name must have as many links as the old name {to replace the old name's record}, Para. 0164-0165, the counting and comparison of the new name's group inherently occurs after the counting of the old name's group, because of the use of the word "then") [Claims 2 & 16].

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28. What Huff fails to explicitly teach is where the data representing the number of times the surname is encountered is part of the surname record. However, Griswold teaches the art of including the number of times a surname is encountered in the data into a data record (surname indicator on genealogy chart, 5:44-48, using Arabic numerals, 6:26-46). Therefore, it would have been obvious to one of ordinary skill in the art, at the time the invention was made, to have added a data field to Person_T table of Huff representing the number of times the surname was encountered, as taught by Griswold, in order to avoid recounting the surname instances on every access of the data, thereby saving processing time, and also to keep an index to the maternal families whose surname is often obscured by marriage [Claims 2 & 16].

29. Claims 3-6, 17, 20, 35, & 37 are rejected under 35 U.S.C. 103(a) as being unpatentable over Huff, in view of Kane et al. (US 6,389,429 B1), hereinafter known as Kane.

30. Huff teaches all the features as demonstrated above in the rejection of claims 1, 15, & 29. Huff also teaches where the individual node records span a single generation (main table Person_T contains the name and basic identifying items assigned to that {one} person, Para. 0135) [Claim 5], or multiple generations (Links_T table contains links to the all the name records in the family, Para. 0137; Links_T can be used separately from the Person_T name data record, Para. 0138) [Claim 6].

31. What Huff fails to teach is where comparing the individual node records and identifying pairs of records having similar names comprises calculating a score representing the likelihood that the identified pair of individual node records represent the same person [Claims 3 & 17], and where comparing and deciding whether the identified pair of individual node records represent the same person comprises revising the score [Claims 4 & 20], and using the assertions of the initial persona record to assign a score to each relationship, where the score

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represents a likelihood that the relationship correctly reflects a relationship between the persons represented by the personas [Claim 35] and assigning assertion scores to the assertions, which reflect a likelihood that a particular assertion correctly reflects an analogous assertion of the person represented by the persona [Claim 37]. However, Kane teaches a system and method for creating and maintaining a database of persons based on a multiple source database, where the relative accuracy of data elements is ranked, and comparisons are made of the data fields in order to rank the source and target database records, to identify the most closely matched database record. If such a record is identified, the fields having a higher ranking than the fields in the target database are updated (abstract). Therefore, it would have been obvious to one of ordinary skill in the art, at the time the invention was made, to have quantitatively scored the persona records and assertions of Huff to accurately predict whether the records described the same person, and to have scored the assertions to decide which to link to the final persona record in the finished database, using the system and method of Kane, in order to keep the information from being and replicated, and also in order to keep the persona records up-to-date. [Claims 3-6, 17, 20, 35, & 37].

Response to Arguments

32. Applicant's arguments filed 2/21/2008, see page 12, first paragraph, in regards to the rejection of claims 1, 12, 29, & 39 under 35 USC 102(b) in view of Huff have been fully considered but they are not persuasive. Applicant states that claims 1 & 29 are distinguished over Huff due to the clarification of "consolidation" as "adding information from a plurality of records determined to represent the same person to the single person record". However, Huff is understood to teach consolidation of names on a search list by navigating and examining a pedigree structure (Para. 155), and connecting the data in duplicate name entries using the

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ADD LINK process (Para. 0158-9). Adding links to a remaining name node in a hierarchical tree representing pedigrees (the Person_T database) is understood to be “adding information from a plurality of records” (the plurality of records in the database). Thus, Huff anticipates the limitation, and so the argument is not persuasive.

33. Applicant further states at page 12, second paragraph that Huff fails to teach assigning relationship types or performing a relationship analysis. However, Huff clearly teaches performing a relationship analysis to infer relationships among persona records using the assertions of the records in Para. 0164 (Before the record is stored in the database and the indicator is set on, the computer first counts the connections of the old name to be deleted. It then counts the connections of the name to replace it. The new name must have at least as many links backward (plus spouse and children--sideways and forward) as does the old name. To limit search time, the search on the new name need only go back far enough to show that it is equal to or greater than the old name); and assigning the relationship types to the relationship between records if a relationship is inferred at Para. 0098 (The central server database is also represented. Two or more sections labeled "Publisher Submission--Basic Data on Individuals" provide space to store the main tables of information about individuals. Submission Lineage-Linking Space represents storage of the submission internal name-linking records. These records comprise a person-identifying number, a code showing his or her relationship to another person, and the number of that other person. There is one record for each relationship between one person and another). Huff is thus understood to count the spouses and children records linked to a plurality of name records to test whether the records represent the same person, and assigning a code showing the person's relationship to another person and a code representing that person's record. Thus, Huff anticipates the limitation, and so the argument is not persuasive.

Conclusion

34. The prior art made of record and not relied upon is considered pertinent to applicant's disclosure.

- Bader (US 5,467,471 A) discloses a hierarchical genealogy database having unique record identifiers for a plurality of entries.
- Cheng et al. (US 6,421,656 B1) discloses an XML data type for indexing structured documents within relational databases.
- Cookson, Jr. et al. (US 7,249,129 B2) discloses a system and method of correlating genealogy records in a hierarchical database, including comparing person records, consolidating data, and preparing a family tree.
- Huff (US 6,760,731 B2) discloses a genealogy registry system.
- Kennedy (US 7,014,101 B1) discloses a system and method of retrieving ancestral information from a database, where the person record is indexed by a memory button.
- Misawa et al. (US 7,162,430 B2) discloses a system and method for evaluating recommendation and transaction information stored in a database.
- Notargiacomo et al. (US 2003/0014422 A1) discloses a system and method for building a family tree by searching multiple databases for information on individuals and assessing the probability that a newly identified individual is related to the original individual.
- Ripps et al. (US 2005/0116954 A1) discloses a method and system for generating a family tree on a user computer, in the form of a timeline.
- Sedlar (US 6,427,123 B1) discloses a method of indexing data in hierarchical relational database.

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Any inquiry concerning this communication or earlier communications from the examiner should be directed to Nikolai A. Gishnock whose telephone number is (571)272-1420. The examiner can normally be reached on M-F 8:30a-5p.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Xuan M. Thai can be reached on 571-272-7147. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

5/7/2008
/N. A. G./
Examiner, Art Unit 3714

/Ronald Laneau/
Supervisory Patent Examiner, Art Unit 3714
05/11/08